

Reconceptualising teacher education in the sub-saharan African context

Article (Unspecified)

Akyeampong, Albert K (2002) Reconceptualising teacher education in the sub-saharan African context. *Journal of International Co-operation in Education*, 5 (1). pp. 11-30. ISSN 1344-2996

This version is available from Sussex Research Online: <http://sro.sussex.ac.uk/id/eprint/44/>

This document is made available in accordance with publisher policies and may differ from the published version or from the version of record. If you wish to cite this item you are advised to consult the publisher's version. Please see the URL above for details on accessing the published version.

Copyright and reuse:

Sussex Research Online is a digital repository of the research output of the University.

Copyright and all moral rights to the version of the paper presented here belong to the individual author(s) and/or other copyright owners. To the extent reasonable and practicable, the material made available in SRO has been checked for eligibility before being made available.

Copies of full text items generally can be reproduced, displayed or performed and given to third parties in any format or medium for personal research or study, educational, or not-for-profit purposes without prior permission or charge, provided that the authors, title and full bibliographic details are credited, a hyperlink and/or URL is given for the original metadata page and the content is not changed in any way.

RECONCEPTUALISING TEACHER EDUCATION IN THE AFRICAN CONTEXT

Kwame Akyeampong
Institute of Education, University of Cape Coast, Ghana
(*Visiting Professor*)
Centre for International Co-operation in Education
Hiroshima University, Japan

1. Introduction

The concern about teacher quality in many parts of Africa and the role teacher education should play in its improvement is becoming an important subject in education development on the continent. This has partly resulted from increasing evidence that despite gains in basic school enrolment, as a result of developing countries implementing Education For All (EFA) initiatives, gains in student achievement have been more difficult to attain.

Ghana is a typical case in point. Since 1987, basic education reforms have seen gross enrolment ratios (GER) at primary school level shoot up by about 37% (Akyeampong 2001), but the gains in student achievement expected from overall reforms has been unimpressive. Yearly criterion-reference tests (CRT) which began in 1992, and was designed to monitor progress in student achievement following the reforms, paint a picture of continuing under-achievement and a very slow rate of progress. For example, of the pupils tested at grade 6 in public primary schools in the 1996 national CRT, only 6% achieved a criterion score of 60% and above in English. Even more worrying, less than 3% achieved a criterion score of 55% and above in Mathematics (MOE/PREP, 1996). Other studies have confirmed that indeed a significant part of the problems have to do with teacher quality. Notably poor instructional quality and lack of professional commitment by teachers (Fobih et. al., 1999) have been recognised as particularly problematic, thus raising the prospect that teacher education programme structure and content might be lacking in producing teachers capable of improving the quality of basic education (Akyeampong & Lewin 2002).

But teacher education programs in Africa have in the past been subjected to reform, mainly by shifting the focus of training more towards school-based contexts to enhance its relevance. Nevertheless, recent studies in some sub-Saharan African countries¹ have strengthened the view that teacher education programme structure and content may be in need of more radical reform, if it is to produce teachers with the sort of professional agency that can address the challenges of improving student learning and achievement outcomes (Lewin & Stuart, 2001).

¹ Multi-site Teacher Education Research “MUSTER” involved four African countries, Ghana, Malawi, Lesotho and South Africa. Trinidad and Tobago was the fifth non-African country involved in MUSTER. MUSTER was begun in 1998 and ended 2001. It examined policy-related issues and the nature of teacher education and was funded by the British “Department for International Development” (DFID).

Mostly in Europe and the US, there is growing experimentation with using “good ideas and strategies born in practice” as the basis for re-organising teacher education programme content and structure to improve teacher quality (Wideen & Grimmert 1995). In the literature, teacher education researchers are calling for greater exploration of the interface between educational theory and the realities of teaching, and proposing models of learning to teach that aim at deepening teachers’ situational understanding of teaching to enhance their professional efficacy (see, Wideen & Grimmert, 1995). Unfortunately, in the African context we are not seeing concerted efforts to evolve systems of teacher education that are culturally sensitive and relevant to local needs. Partly this might be due to the paucity of teacher education research in African contexts that has over time, accumulated into a body of knowledge offering insights into the appropriate conceptual model that can change the way in which teachers have traditionally viewed their professional roles and responsibilities in the classroom.

The wider literature on teacher education and teaching carries examples of programmes that have adopted particular conceptions of learning to teach to highlight particular paradigms of teacher education responsive to their situation (see, Howey 1996). Out of these attempts (mostly in high income nations) have come models such as “reflective practice” (Schon, 1983, Eraut, 1994), “cases and case methods in teacher education” (Merseeth 1996) etc. that carry certain assumptions about the cultural roles of the teacher, pedagogical preferences, infrastructure availability and classroom ecology which seem to lose their edge when transferred into African contexts.

Studies show that African teachers may be aware of and appreciate the value of more progressive approaches to teaching and learning, but fail to make them a consistent part of their practice (Akyeampong et. al., 1999; Penny & Jessop 1998; Lewin & Stuart 2001). What might account for this? Some teacher education researchers are of the view that the assumptions upon which borrowed models are based are not recognisable in the African context, causing their value to be compromised and relevance restricted (Lewin & Stuart, 2001). Issues such as the classroom ecology, basic teaching and learning infrastructure and the professional role and identity of teachers may be quite different when we are talking about education in Africa.

In this paper an attempt will be made to address such issues and suggest a conceptual framework for restructuring teacher education that brings into sharper focus the implications of the realities and needs of schooling for changing how teachers have traditionally viewed their professional responsibilities.

But first the paper starts by looking at what the dominant approach to teaching and learning as portrayed in the literature on African schooling is, since that has been considered by some as the major resistive force to change (Jessop & Penny, 1998).

2. Conception of teaching and learning – Issues and Challenges

Teaching in many developing countries is mainly characterised by authoritarian, teacher-centred approaches that are linked to behaviourist approach to learning (Avalos 1991). The behaviourist position, originating with the work of Pavlov and Skinner, emphasises the ways in which the knowledge, communication and practical skills of the teacher brings about learning in terms of observed changes in pupils; teaching is foregrounded.

Many studies in Africa illustrate the fact that this is a dominant approach in both teaching and learning. Kanu (1996) studied classroom practices of social studies teachers in the West African state of Sierra Leone and commented that the teaching learning traffic was one way, and followed the pattern of,

Teacher asking the students to read sections of the prescribed textbook; teaching engaging in a monologue to explain what has been read to ensure that all the essentials (usually factual details) have been covered; and teacher testing the students to see how well they can recall the material contained in the reading (p. 175).

Anyone who has observed classroom discourse in many African schools will recognise this as a familiar trend. Kanu believes that a major contributory factor to this trend is Government prescribed textbooks that are often filled with factual knowledge students are required to remember. In Botswana, Tabulawa (1997) points out that primary teachers are basically concerned with imparting knowledge and to achieve that aspire to maintain an orderly classroom environment. Students in this environment also perceived learning as acquiring and assimilating knowledge. According to Tabulawa, the view of schooling as vocational coupled with an examination culture that filters students towards paid jobs in the labour market has given life and sustenance to pedagogical classroom practices founded on behaviourism. The role of teachers and students in classrooms are clearly defined and mutually respected. As Tabulawa points out,

It was students' understanding of *doing school work* as *receiving* the teachers' knowledge that helped them define their own as well as the teachers' roles and responsibilities in class. This was also a view shared by parents who also believed that students acquired school knowledge by listening and carrying out orders from the teacher and by studying hard (emphasis in the original p. 200-201)

Akyeampong, Pryor and Ampiah (1999) studying about fifty Ghanaian teachers' understanding of learning teaching and understanding in INSET workshop settings, found that the teachers instinctively defined learning based on models consistent with transmission or behaviourist theories. But probed further, they were able to visualise real contexts in their classrooms where children actually learnt through social interaction and interrogation of ideas. This led them to conclude that constructivist learning was recognisable to the teachers, it had just not received any validation. It would appear that the pedagogy of teacher education in Ghana creates a certain mindset about teaching that legitimises the behaviourist approach (Akyeampong et. al., 2000).

Jessop and Penny's (1998) study of teacher voice and vision in the narratives of rural South African and Gambian primary school teachers also reveal teachers as possessing authoritarian values about teaching premised on the notion of knowledge as objective and to be transmitted from teachers to students. Also they found that teachers had abdicated responsibility for exercising agency over what they taught, to whom, how and for what reason (p. 393). They referred to one aspect of teachers understanding about teaching emerging from their data as the 'instrumental frame', manifesting itself in the form of learning rules without understanding and a fixed view of what constituted knowledge. In particular, Gambian teachers showed "a lack of discrimination and judgement over what may be appropriate in any one teaching and learning situation" (p. 397).

This last point is worrying especially if one accepts the argument that effective teaching is always contingent on an array of intervening variables that mediate the effect on student learning outcomes and achievement (Danielson 1996). Because of that, "there is always a *ceteris paribus* clause hovering over any instructional prescription" (Labaree 2000, p. 231). Therefore if any group of teachers are unable to think and act in ways that are responsive to micro realities, then this will always place a limitation on their teaching effectiveness. It may be that certain types of teachers in Africa (under-qualified or untrained) lack a certain level of sophistication in reflection on practice because of deficits in their professional knowledge base and therefore require coaching to be more reflective in their practice (O'Sullivan, 2001).

Research exploring African teachers' roles and competencies in practice has suggested that prescriptive instructional behaviour has become so deeply entrenched in the professional culture that progressive teaching methods, such as 'child-centred', reflective practice approaches stand little chance of gaining ground in classroom practice. There are several clues as to why this may be so. First, school textbooks and curriculum documents e.g. syllabuses are written mostly in deterministic style that corresponds with and validates the prescriptive and authoritarian structure of teaching and learning. At the same time many teachers do not have access to other reference materials apart from government prescribed textbooks which then become the only definitive article for the content and process of teaching. Textbook availability and supply has come to occupy such a vital part of improving basic education in developing countries (Windham 1988; Lockheed & Hanushek 1988), and for good reason – textbooks to pupil ratios can be as low as one to eight (see Fobih et al., 1999; NEIDA 1992). Improving the situation is a gigantic task. The network of Educational Innovation for Development in Africa 'NEIDA' (1992) estimated that by the year 2000 Africa would need US\$1390 million worth of educational materials, but was only capable of importing US\$625.7 million worth. This is good reason for adopting a more multi-faceted approach to addressing the problem that might also help teachers to become less restricted in their choice of reference material for teaching.

One strategy that might be considered is the provision of resource centers with a wide variety of curriculum materials in print and electronic form and within easy access for

teachers to use. It is even more important for such curriculum materials to adopt formats that reflect philosophies of knowledge underlying interpretative teaching practices.

But is it possible for teachers to be effective in their practice in under-resourced classroom conditions? Some evidence about teachers' classroom work in Africa suggests that teachers can attain a satisfactory measure of effectiveness despite the lack of textbooks and other infrastructural facilities. What is more interesting is that the key to their teaching effectiveness is their ability to innovate and be more original in teaching. For example, Harley et al., (2000) researched some South Africa teachers working in under-resourced schools, with few textbooks and stationery, bare floors, dull walls – typical of many African schools, and found many were effective in achieving positive goals of instruction. Such teachers did not necessarily follow policy prescriptions about the goals of classroom practice, but demonstrated competencies that were more in tune with the micro realities. However, Harley et al., noted that the conditions unquestionably encouraged a teacher-centred pedagogical approach.

Croft (2001) studied lower primary Malawi teachers working under very deprived environments and saw evidence of teachers with a deep contextualised understanding of children and who used their own experience to improve practice. Some of the practices she observed included for example, singing songs for both learning and classroom management, using older/brighter children as models, giving slower individuals attention after school. Croft described some of the whole class teaching as “children-centred” rather than child-centred.

O'Sullivan (2001) worked with Namibian teachers under INSET conditions and “encouraged teachers to use sand as a writing tool in view of the shortage of textbooks and paper” (p. 105), and noted that this strategy was just as effective.

These might not be sufficient cases upon which to develop a hypothesis or build a theory about teaching effectively under conditions of scarcity. But they make an important point that this paper wishes to recognise as key to improving the quality of many African schools – that teachers can become effective when they assume greater pedagogical flexibility in response to better understanding of the micro realities of teaching situations. Besides such teachers would be more psychologically prepared to address the challenges of their profession especially in rural communities where “the nature of the challenge becomes exponentially daunting” (Harley et. al., 2000, p. 288).

A second reason why interactive teaching methods face an uphill task in dislodging the dominant authoritarian pedagogical style in African schools may be because the two are based on different assumptions about social interaction and behaviour from which teacher roles and responsibilities are defined. Tabulawa's (1997) ethnographic study of Botswana teachers' pedagogical classroom practices in particular illuminates this point. Tabulawa analysed beliefs and conceptions of teaching and learning and compared them with an analysis of the socio-cultural and historical roots of education development in Botswana. He noted that

The historical and empirical evidence ... indicates that the authoritarian pedagogical style that so much characterises classroom practice in Botswana has evolved over a long period of time and is now part of the immunological condition of the education system. *Pedagogic innovations that are not pre-adapted to this condition would not be easily institutionalised* (emphasis added by this author p. 202).

In effect, Tabulawa is suggesting that pedagogical change is simply not a technical matter, and that because pedagogical practices really reflect the evolution of certain social values, real change can only occur if they are born out of existing realities shaped by these values before entering mainstream conception of professional practice. There is some evidence which suggests that resistance to pedagogical change is indeed, due to a clash in social values. For example, O'Sullivan found that some Namibia teachers having been educated in the Bantu education system "which did not encourage them to ask questions, to criticise or to develop and express their own ideas" (p. 112) were less enthusiastic about reflective teaching approaches. Harley et al., (2000) also noted that certain values in Zulu rural communities of South Africa became a resistive force to changes that sought to encourage students to enter into greater critical dialogue with teachers. Teachers' dilemma was that this could lead to children becoming more critical and start to "question their parents' authority and adopt values that conflict with their community" (297).

The fact is, in many traditional African societies knowledge is seen as something fixed, finite and to be handed down, rather than something to be explored, questioned and developed along new lines. The elders are respected because they have this knowledge, and can teach it to the young, whose role is to listen rather than be preoccupied with questions. The argument of Tabulawa and others is that such deeply rooted cultural assumptions have contributed to the resistance to educational change in African classrooms, particularly where this involves the idea of teacher and learner entering into dialogue and pursuing inquiries together. The crux of this point is that pedagogical styles are not value-free. Thus, encouraging a dialogic pedagogical stance in cultures that do not share the same epistemological and ontological assumptions about the social construction of knowledge is unlikely to produce meaningful transfer.

At this point, it is important to make a distinction between the humanistic and liberal values that research evidently suggests African teachers demonstrate in their social relationships with students, and values upheld in pedagogical classroom relationships. The growing body of research in African contexts indicates that what is deeply valued by student teachers and beginning teachers is the clearly defined role of the classroom teacher as capable of transmitting knowledge clearly and effectively to students (Akyeampong & Stephens 2000; Lewin & Stuart, 2002; Jessop & Penny 1998).

What are the implications for change, especially if one accepts Schon's (1983) assertion that the teacher's expertise lies less in routinely applying theoretical knowledge than in framing problems in new ways, carrying out experiments in action, and finding

appropriate solutions in unique situations. Before anticipating meaningful change certain features of the larger system must be recognised as equally significant and addressed.

Teachers everywhere have to juggle the many conflicting and competing values within their professional world and adopt roles and competencies that protect their professional credibility among their students and within the larger society (Harley et al., 2000). Akyeampong, Pryor and Ampiah (1999) INSET activity study of some fifty Ghanaian teachers' offers a classic illustration of this fact. Based on the rich insights that their work provided, they observed that,

Ghanaian primary schools have to balance many conflicting pressures. A very apposite example of this ... was provided by a teacher in one of the few groups who, when sorting statements placed memorising facts at the top of the list and immediately remarked that "*when you memorise facts, you tend to forget them straightaway*". The obsession with testing which demands the recall of facts and that hangs over African education as almost the sole arbiter of educational success, makes such seemingly conflicting views a rational statement of the paradoxical context in which teachers have to work (p. 13)

There is enormous pressure on students to attain good results to enable them climb into next levels of education and increase their chances of securing the few good job opportunities that are available in generally weak economies. Thus, underdevelopment has a way of even influencing what goes on in classrooms. As Ayassou (1991) succinctly points out "it is paradoxically true that countries which lack financial means and trained human resources are often those with very selective and uneconomical school systems" (cited in N'tchougan, 2001 p. 151). Teachers undoubtedly feel pressured into assuming classroom roles that maximise students' chances of passing examinations to move on to the next level. Often this means teachers adopting didactic methods of teaching. Under such forces, issues about context, student characteristics and other micro factors within the school/community environment which teachers need to seriously attend to in order to maximise learning output for *all* students, gets relegated into bottom place in the list of priorities. Coupled with cultural assumptions about knowledge as existing apart from the individual and the social context, and best acquired through transmission methods, change becomes more than a question of mandating new orientations to teaching. Rather it becomes much more complex; requiring several measures occurring simultaneously to validate changes anticipated at the classroom level.

At the macro education level, for example, there must be a conscious effort to reform examination systems to tie them more with curriculum and classroom pedagogical reforms. The problem that assessment in general and examinations in particular pose to changing curriculum and pedagogical practices is illustrated in Lewin & Dunne's (2000) study of primary science assessment practices in nine Anglophone African countries. One aspect of their analysis revealed that knowledge type items predominantly requiring recall constituted up to 70% of all items. Over 25% of items could be classified as comprehension, and only 4% appeared to be at the level of application (p.7). Overall, Lewin & Dunne's "analysis suggests that often it is possible to achieve pass grades

without demonstrating achievement at higher cognitive levels” (p. 4). Such observation in a subject that is expected to present the best opportunities for interactive and experiential learning requiring questions that test higher-order cognitive ability is rather disappointing. Given such a situation, realistically one cannot expect teachers to change the way they teach when in the end examination practices undermine the very changes that are being proposed.

It may also be difficult to change the values that inform the way in which societies view knowledge and define teachers’ classroom roles and responsibilities. The literature suggests that, teachers’ conception of themselves, their roles and identities are shaped by their own biographical experiences, of which, the home environment (a microcosm of society) plays a crucial part (Wideen *et al.*, 1998). Thus, the impact of traditional social values about knowledge on teacher role identity cannot be underestimated. However, traditional values about knowledge and teacher role identity are not immune against the influence of globalisation. Already, globalisation is changing the way in which societies view themselves. The development of new information and communication technologies (ICTs) has been rapid and is transforming work and knowledge production. The implications of these changes are extensive and affect both developed and developing countries, although it would seem that developing countries would need more support to take full advantage of ICTs (Lewin, 2000). As African societies at macro and micro levels become less autocratic, embrace global technologies, promote democratic values and tolerate divergent viewpoints, it is possible to see interactive discourses become more valued and feature strongly in classroom practice.

Teacher education in Africa has an important role to play in changing the way in which teachers have traditionally viewed their professional roles and responsibilities in the classroom. As was pointed out in the introduction of this paper, for this to occur successfully it needs radical reconceptualisation. Before addressing this issue, it is instructive to examine briefly some of the underlying philosophies of learning to teach in some teacher education systems in Africa.

3. Conceptions of Learning to Teach: Insights from the MUSTER studies

This section draws from a recent “multi-site teacher education research project” (MUSTER) including Ghana, Malawi, Lesotho and South Africa. The MUSTER studies offered a good opportunity to critically examine the underlying philosophies of some teacher education programmes in Africa, and to evaluate their potential for producing effective teachers.

Learning to teach is a complex affair. Research suggests that teachers’ classroom practice is more than a function of the content of teacher education programmes, and that teachers’ personal socio-historical past, beliefs and values play a large part in shaping their classroom behaviour and practices (Wideen *et al.*, 1998; Knowles, 1992). But as Wideen *et al.*, point out,

“programs of preservice teacher education, including campus and field experiences, can provide the ideal setting in which individuals learn to teach. It is the one time when they can concentrate on examining their beliefs about teaching and acquire the skills and knowledge to be competent beginning teachers” (p. 144)

Thus despite the complexity of becoming a teacher, teacher education programmes can become mechanisms for directly shaping the kind of teachers expected in a society. However, since prospective teachers already come into training with very strong notions of what teaching is, emanating from their prior background experiences (Lortie, 1975; Bullough *et al.*, 1997; Akyeampong & Stephens, 2002), the task of teacher education to effect desirable change becomes an even bigger challenge. If poorly conceptualised and structured, it can only serve as “a weak intervention layered between the life history of being a student and the socialisation process of the school” (Wideen *et. al.*, 1998).

According to Akyeampong & Stephens (2002), “the input characteristics and qualities of the typical beginning student teacher are important indicators of the quality of trained teachers at the point of exit ... ” (p. 4). MUSTER studies examined what some of the typical input characteristics beginning student teachers in the four African countries are. Generally, the studies suggested that the majority brought into training:

- Well developed images of the good teacher, which seem to focus particularly on the personal and affective aspects of the role
- Typically vaguer ideas about how good teaching and learning actually occur, but which are modeled on what they have seen their own teachers do
- A wider socio-cultural heritage that may include deep-rooted and powerful myths about the role of the teacher, which trainees may have incorporated into their self-image/role identity
- Much of this is emotion-laden, and therefore resistant to change (Lewin & Stuart, 2002).

These were some of the challenges that teacher education in the MUSTER countries faced. In a comparative analysis of the curricula of these countries and through interviews for college tutors’ views of the kind of teacher they wanted to produce, two broad themes stood out: first, to produce a teacher who knew their subject and could teach it effectively, and someone who related well to children. The following oversimplified phrases were some of the emphases in the different country systems. The teacher produced by training should be:

- In Ghana, a ‘technical practitioner’
- In Lesotho, well-grounded academically
- In Malawi, an efficient instructor
- In South Africa, a critical educator. (Lewin & Stuart, 2002)

Generally, whilst many of the formal programme aims – and often the espoused aims of teacher educators – highlighted professional attitudes, responsible behaviour, and

interpersonal skills, there were no specific areas in the curriculum as documented or as delivered where these were discussed or developed (Lewin & Stuart 2002). This highlights a major weakness of teacher education in African contexts. According to Lewin & Stuart:

The curriculum documents often list a range of student-centred, interactive and participatory methods – demonstrations, groupwork, role-play, fieldtrips, project work – but observations in three of the African sites revealed a predominantly teacher-centred transmission mode. Teaching ‘subject content’ resembled traditional high school methods: the college tutor would present information orally, using the board or textbook, interspersed with (tutor) questions and (student) answers; only occasionally were attempts made to develop a class discussion. ...in the main, trainees were *told*, about how to handle primary classes, and occasionally *shown*, (through demonstration lesson), but very seldom did they actually *experience* the kind of student-centred methods that they preached (emphasis added p. 59).

The MUSTER studies showed many similarities between how teaching and learning occurred in schools and training college institutions. Mainly teacher education pedagogy was prescriptive and teacher-centred. Also there was little indication of teacher education being a transforming experience that shaped motivation and pedagogic beliefs. In the Ghana context, Akyeampong & Lewin (2002) explored changes in becoming a teacher from the perceptions of three groups of teacher education trainees – those beginning training, those completing training and those with two years experience in schools. They concluded that the effects of training did not show unambiguously in their data. For example, although they found that enthusiasm for teaching facts diminished with training and time, it still remained a dominant perspective. Also, although group work was emphasised and rated highly by student teachers and newly qualified teachers, this seemed more a reflection of an aspiration, than a commitment to use the approach.

What appears quite typical in many of Africa’s teacher education programmes is an attempt to legitimise a view of professionalism based upon ideal conditions of plenty. There is an assumption that once teachers have acquired the ‘legitimate’ tools of the trade – which often means specific pedagogical knowledge and skills, they will with some exposure to the classroom environment through practicum, be able to foster teaching as theoretically conceptualised in training. In other words, a decontextualised professional knowledge base of teaching is upheld. From it, teachers’ qualification status is derived and validated. Courses and assessment practices are therefore heavy on theory and standardised practice in decontextualised context. Learning to teach is presented as not about uncertainty, but about definite rituals that transcend the boundaries of context leading to a notion of teaching as relatively easy and unproblematic (Labaree, 2000). With learning to teach and teaching portrayed in this way, there is the tendency to blame something or someone else for school failures.

In many developed country systems researchers and policy makers have been advocating and experimenting new models of learning to teach take challenges myths about effective

teaching (Wideen et al., 1998; Wideen & Grimmer, 1995), but we see very little of such advocacy in Africa. Once again, Africa is at the receiving end of what has been determined to be good elsewhere.

If indeed current systems of teacher education in Africa are not capable of making much of a difference in changing pedagogical beliefs and practices, what is the way forward? The next and final section of this paper addresses this issue

4. Reconceptualising Teacher Education in African contexts

One thing stands out clearly from the discussions in this paper about teacher education in Africa - that they do not feature strongly the ecological context and see it as an environment with potential for innovative and exemplary practice. There are two perspectives that this paper takes, on this issue – one is that African realities must inform teacher education curriculum planning and actualisation. In other words, African teacher education curriculum needs to value African classrooms and school environments as rich sources for generating good ideas and strategies for teaching, despite their well-known limitations. When one reads the literature on schooling in Africa, one gets the impression that the African classroom is an educationally disaster zone with the only hope of resuscitating it coming through innovations that have worked elsewhere and packaged almost in the same way as technical assistance is packaged and presented. Education innovation in Africa must be freed from this mindset. Student-centred teaching, for example, must not be defined and presented as the only right way to teaching irrespective of conditions; it can only be one of the many ways in which learning can be promoted given the conditions under which that learning is taking place. Understandings of pedagogy that go the heart of the African teachers' sense of professionalism invoke a particular set of theological positions that should be acknowledged, extended and dialogued.

A key step towards achieving this is to ensure that teacher education instructional materials are less close-ended – this is to break with the deterministic view of teaching. Instead, more open-ended and inquiry based approaches must be introduced and made to become the building blocks for learning about teaching in African contexts. As teacher trainees use such materials, create new ones 'on the job' and document their learning experiences, they should end up developing more personalised understandings of teaching that make them more effective practitioners. Under either pre-service or in-service conditions the approach to learning to teach should have substantial elements that are workshop activity based where situations are analysed and new practices or ideas are tried out on the spot (cf. Joyce & Showers, 1982).

What should become of the more conventional pedagogy of teacher education such as, 'pedagogic content knowledge', 'education and professional studies', 'subject content' etc.? Along with learning and educational theories (e.g. child development), these should still have important roles in learning about teaching, but must be presented in contexts which allow them to be critiqued in the light of local culture, norms and conditions.

Also, it is important that they are presented through inquiry-based methodology with greater responsibility for understanding their role in localised context shifted to trainees.

Table 1 below presents some of examples of issues that were found to be relevant in certain situations of learning to teach in Ghanaian context and that could be turned into opportunities for changing professional learning outcomes (Akyeampong 2001).

Table 1 Restructuring teacher education around activities

Issue	Possible Activities
1. Students' centred instruction	Activities to increase student participation in learning under different classroom conditions encountered in the field. Examples could be question and answer teaching, recitations and chalkboard work by pupils.
2. Teacher Lesson Notes	Activities to make lesson preparation notes less of a ritual and more of a guide that reflects individuality as well as drawing from the input of teacher groups working under similar conditions.
3. Group Work	Activities exploring the functions and dynamics of group work in local situations and how they might be applied in teaching and learning context.
4. Mixed Ability Grouping	Activities that examine management of mixed ability teaching. Mixed ability grouping is quite common for many reasons, e.g. automatic repetition, low enrolment and staffing in rural areas etc.
5. Instructional Resources	Activities to demonstrate effective teaching using semi-concrete instructional ideas. Exploring teaching using a variety of print materials that encourage the social construction of knowledge
6. Classroom Management	Activities to explore the psychological effects of caning on learning behaviour and personal development. Investigate what other forms of disciplining children exists in society and which are good or bad practices and why.
7. Pedagogical Knowledge and Skills	Activities that explore positive attitudes and dispositions to enhance teaching and learning. Activities that make teacher thinking and creative actions the cornerstone of effective teaching. Elevating the complexity and ambiguity of classroom teaching that moves trainees from being dependent on the teacher educator for providing answers to becoming more autonomous (Grimmett 1995).
8. Values in Teaching and Learning	Activities that examine underlying values behind different teaching cultures. Exploring social values that can be used to change classroom instructional organisation.

A second important perspective that was mentioned in the introductory part of this paper is to elevate the view of effective teaching as actually a function of teachers' professional reasoning ability and not of predefined behaviour. According to Shulman (1987) pedagogical reasoning is linked to the practical aspect of teaching through teachers' comprehension of purposes, subject matter structures etc. and ability to transform these through stages of preparation, representation, selection and adaptation.

Teacher education assessment practices in both developed and developing country systems have received the least attention in reform efforts, but more so in the developing world. Space will not allow for a deep analysis of the condition of teacher certification assessment except to point out that it too must be reconceptualised so that it is aligned with any new orientation of teacher education. Based upon the forgone discussions, it is necessary to design and institute assessment policies and practices that affirm practical problem-solving abilities in *localised* contexts as the basis for judging effective teaching. Ultimately, the goal of teacher certification should be to determine to what extent prospective teachers and beginning teachers have "... acquired the *knowledge* and *judgement* required to evaluate what strategies are appropriate in very different situations and whether (they) can apply these understandings in practice" (Darling-Hammond et al., 1999 p. 101). Assessing such abilities will require more complex assessment methodology with its attendant need for flexible criteria and trained assessors who can apply them intelligently to preserve the spirit of teacher professionalism in African contexts.

5. Conclusions

This paper has argued for changes to teacher education in African contexts that can improve its relevance and enhance its impact. A critical analysis of the issues confronting teacher education was undertaken and several points were noted as elements that need special attention. Teacher education will not have the desired impact if it is disengaged from the ecological context. This point has been repeatedly emphasised in this paper. Also, the strong behavioural and authoritarian perspective will simply not disappear because of some 'superior' models that are introduced. Teacher education in Africa must have a distinctive character of its own that is founded on African values and critiqued to evolve better ideas and strategies, and integrated into praxis.

Throughout the paper, it has been argued that other features of the macro education system – examinations culture and instructional resource availability and diversity – must be recognised as equally significant, and addressed, if teacher education restructured along the lines discussed is to lead to improved teacher quality.

Another important issue that may be adduced from this paper is this. Simply locating a greater part of teacher education in school-based context by itself is not a panacea for addressing the issue of teacher quality, at least not until the curriculum that underpins it is structured to engender a high sense of professional agency. It is the view of this paper that reconceptualising teacher education along lines which make trainees experience the world of teaching as it actually is, and build the greater part of their understanding of

teaching from these experiences has greater potential to improve the quality of trained teachers in Africa.

References

- Akyeampong, K (2001) "Initial Teacher Training in Ghana - Does it Count? – A Country Report" *MUSTER Discussion Paper* Sussex: Centre for International Education, University of Sussex, UK.
- Akyeampong K. & Lewin K. (2002) "From Student Teachers to Newly Qualified Teachers in Ghana: Insights into Becoming a Teacher" Forthcoming in *International Journal of Education Development*
- Akyeampong, K & Stephens D. (2002) "Exploring the backgrounds and shaping of beginning student teachers in Ghana: Toward greater contextualisation of teacher education. Forthcoming in *International Journal of Education Development*
- Akyeampong, K., Ampiah, J., Fletcher, J., Kutor, N. & Sokpe, B., (2000): "Learning to Teach in Ghana: An Evaluation of Curriculum Delivery" *MUSTER Discussion Paper 17*. Sussex: Centre for International Education, University of Sussex. ISBN 0 905414306
- Akyeampong, K., Pryor, J & Ampiah J (1999) ' A vision of successful schooling: Ghanaian teachers' understanding of learning, teaching and assessment' Paper presented at BERA conference University of Sussex (September 1999).
- Avalos, B. (1985) Training for Teaching in the Third World: Lessons from Research, *Teacher Education* 1 (4) pp. 289-299
- Bullough R. V., Knowles, J.G. & Crow (1997) *Emerging as a Teacher*. London & New York: Routledge
- Danielson C. (1996) *Enhancing Professional Practice – A Framework for Teaching*. ASCD publications
- Darling-Hammond L., Wise A. E., & Klein S. P. (1999) *A License to Teach: Raising Standards for Teaching*. Jossey-Bass Publishers
- Fobih, D., Akyeampong, K & Koomson, A. (1999) *Ghana Primary School Development Project (GPSDP): Final Evaluation of Project Performance*, (Accra, Ministry of Education)
- Ghana Education Service/Teacher Education Division (GES/TED) (2001) "Manual for Teacher Trainees on School Attachment. (August)
- Grimmett P. (1995) 'Reconceptualising Teacher Education: Preparing Teachers for Revitalised Schools' in Wideen, M & Grimmett P. (1995) (Ed.), *Changing Times in Teacher Education: Restructuring or Reconceptualisation?* London & Washington: Falmer Press.
- Harley K., Barasa F., Bertram, C., Mattson, E., & Pillay, S.(2000). "The real and the Ideal": teacher roles and competences in South Africa policy and practice. *International Journal of Educational Development* 20, 287-304
- Hedges J. (2000) "The Importance of Posting in Becoming a Teacher in Ghana" *MUSTER Discussion Paper 13* Sussex: Centre for International Education, University of Sussex, UK.
- Howey K., (1996) "Designing Coherent and Effective Teacher Education Programs" in Sikula et al., (Eds.) (1996) *Handbook on Research on Teacher Education*, Simon & Schuster Macmillan & Prentice Hall International

- Jessop, T. & Penny, A. (1998) "A Study of Teacher Voice and Vision in the narratives of Rural South African and Gambian Primary School Teachers" *International Journal of Education Development*, Vol. 18(5): pp. 393-403
- Joyce, B. & Showers, B (1982) The coaching of teaching, *Educational Leadership* 40, 2, pp. 4-10
- Kanu Y., (1996) "Educating Teachers for the Improvement of the Quality of Basic Education in Developing Countries" *International Journal of Educational Development*. Vol. 16, No. 2 pp. 173-184
- Knowles, J. G. (1992) "Models for Understanding Pre-service and Beginning Teachers' Biographies' in I. F. Goodhksn (1992) (Ed.), *Studying Teachers' Lives*. London & New York: Routledge
- Labaree, D. F. (2000) "On the Nature of Teaching and Teacher Education", *Journal of Teacher Education*, Vol. 51, No. 3. June pp. 228-233
- Lewin K., & Stuart J. (2002) Final Evaluation of Teacher Education in Five Developing World Countries – MUSTER Report, Forthcoming DFID Report, UK.
- Lewin K (2000) "New Technologies and Knowledge Acquisition and Use in Developing Countries" *Compare*
- Lewin K., & Dunne, M (200) "Policy and Practice in Assessment in Anglophone Africa: Does Globalisation explain Convergence?" *Assessment in Education: Principles, Policy and Practice*. Special Issue: Globalisation, Qualifications and Livelihoods. Vol 7 No 3 pp299-312
- Lortie, D. (1975), *Schoolteacher: A sociological study*. Chicago: University of Chicago Press
- Lockheed M. & Hanushek E. (1988) "Improving Educational Efficiency in Developing Countries: What do we know?" *Compare* Vol. 18. No. 1
- Ministry of Education/Primary Education Project (MOE/PREP) Ghana (1996) "Report on the Administration of Primary 6 Criterion-Referenced Tests"
- Ndawi O. P., (1997) "Education for All by the year 2000 (EFA 2000) In some countries in Africa: Can Teacher Education ensure the quantity, quality and relevance of that education" *International Journal of Educational Development*, Vol. 17, No.2 pp. 121-128
- NEIDA (1992) (Network of Educational Innovation for Development in Africa). *The Situation of Educational Materials in Africa*. Dakar, UNESCO.
- N'tchougan-Sonou C., (2001) "Automatic promotion or large-scale repetition – which path to quality?" *International Journal of Educational Development* (21) pp. 149-162
- O'Sullivan M., (2001) "The inset strategies model: an effective inset model for unqualified and underqualified primary teachers in Namibia" *International Journal of Educational Development* 21, pp. 93-117
- Schon D. (1983) *The Reflective Practitioner*, London: Temple Smith
- Shulman, L. S. (1987) "Knowledge and Teaching: Foundations of the New Reform." *Harvard Educational Review* 57(1): 1-22.
- Tabulawa R. (1997) "Pedagogical Classroom Practice and the Social Context: The Case of Botswana" *International Journal of Educational Development*, Vol. 17(2): pp. 189-204

- Wideen, M., Mayer-Smith J., & Moon B (1998) 'A Critical Analysis of the Research on Inquiry' *Review of Educational Research*, Vol. 68(2) pp. 130-178
- Windham, D. M. (1988) "Improving the Efficiency of Educational Systems: Indicators of Educational Effectiveness and Efficiency". State University of New York at Albany

One of the ways teacher education reform has responded to the challenges of improving the quality of teachers it produces has been to increase the component of school-based training with the hope that prospective teachers can situate their understanding of teaching in practical contexts. But a closer look at the curriculum of some school-based teacher education programmes in African context shows that the expected learning outcomes are narrow and would hardly achieve this purpose. This is because learning to teach is simply presented as a predetermined behavioural task essentially requiring the application of standardised teaching methods, thus denying the opportunity to develop adaptive behaviour in response to micro realities (Akyeampong 2001, Lewin & Stuart 2001). Critical dialogue, critique and evaluation, ingredients for developing personalised understanding of teaching and adaptive behaviour in response to local realities is often missing in the curriculum of school-based teacher training.

Two restructured African teacher education programs, Ghana and Malawi, that have sought to emphasise school-based training provide illustrative examples of this point.

Ghana in 2000 embarked upon restructuring of its pre-service basic teacher education programme leading to a change from the 3-years residential college programme to two years college training and *one full year* spent training in schools. The expectation from this change was that "through work-study in schools ... trainees will learn to teach by teaching and thus become competent and efficient basic school teachers" (GES/TED 2001, p. 3). The Teacher Education Division (TED) of the Ghana Education Service (GES) produced a training handbook to guide trainees to achieve this objective. Although the handbook offers some helpful suggestions in terms of boundaries for professional practice e.g. role of feedback in teaching and learning, generally it oversimplifies teaching by not providing space for critical dialogue with teachers, pupils and school community leaders into some of the real conditions that influence school effectiveness. For example, the handbook specifies the behaviour expected from trainees especially when it comes to living in a compound house², how they should prepare their meals and generally the kind of social adjustment expected of them as prospective teachers. They are also to note pre-specified classroom behaviour of teachers e.g. use of feedback techniques, use of teaching and learning materials, structure and content of lesson plans etc.

The nature of certain factors (e.g. pupil background characteristics, classroom ecology, and infrastructure facilities) that might mediate effective teaching and how they lead to certain teaching culture are not presented as important issues for professional learning.

² Compound houses are living environments housing many families. Many beginning teachers in Ghana may find that

Similarly, the wisdom of teachers' craft knowledge is ignored, although teachers' wisdom about practice accumulated overtime in response to actual needs are rich sources for learning about how theory gets amalgamated into practice.

In the case of Malawi, one- and two-year residential training programs were replaced in January 1997 by a 2-year mixed mode integrated in-service teacher education (MIITEP), where unqualified servicing teachers spend 3 months at college followed by 20 months distance learning under supervision in their schools. As in Ghana, this extensive period training in schools does not seem to offer the opportunity to develop personal agency in teaching reflecting realistic needs in the school and classroom environment. Essentially, the pedagogy of school-based teacher training portrays teaching as unproblematic once certain prescriptive actions and behaviour are fulfilled. As Lewin & Stuart (2001) point out,

School-based units in the MIITEP programme focusing on management and administration of schools, keeping records', roles of heads and PTA, school and community relationships, professional ethics and conditions of service, are all presented as 'given', without much contestation and opportunity to critique and evaluate practical situations that might lead to conceptual shifts in teacher thinking and practice (p ???).

School-based teacher education in both Ghana and Malawi attempt to socialise teachers into a uniform culture based on the assumption that schools, communities and pupils are the same, when in fact these are known to be highly variable. For example primary schoolteachers in Ghana face acute textbook shortages, and in more rural regions have to grapple with the effect of certain commercial activities on school attendance e.g. fishing, farming and, girl-child labour (see Akyeampong et. al. 2000, Hedges 2000, Fobih et. al., 1999). These are glossed over as if they are inconsequential to effective classroom teaching and learning.

What we see in both systems is the relegation of the realities of teaching into the background. Teaching is presented as a matter of fulfilling a set of professional responsibilities and actions. Also, one does not see learning to teach as a task contingent on context and which raises the importance and critical role of adaptive behaviour. Neither are the presuppositions upon which classroom teachers base their work and the effect of the psychological context brought into focus in the discourse of learning to teach. In effect the move towards school-based teacher education can be aptly described as "restructuring without appropriate reconceptualisation" (Wideen & Grimmer 1995). According to Grimmer (1995) restructuring in teacher education has the potential to become productive if it leads to changes that provides opportunity for good ideas and strategies born in practice to become valued and enter mainstream conceptions of professional practice. However, the assumptions of school-based teacher education pedagogy in both Ghana and Malawi, undermine learning from the real world of teaching, vis-a-vis how teachers adapt theory to practice, or develop craft knowledge through practical experience.

In particular, the notion of teaching as an ill-defined problem that can have no predefined solution strategies (Yarbrough 1999, Labaree 2000) will be presented as an important ingredient in a reconceptualised framework for change in teacher education in the African context. Because of the strong deterministic nature of teaching and learning in African schooling, this point is particularly crucial. It is a notion which posits that teacher's representation of teaching provides the boundaries for conceiving their solution strategies. Consequently, if teachers are unable to appreciate the full implications of micro realities such as particular student background characteristics, classroom climates and resources, their pedagogical practices are unlikely to improve the quality of student learning outcomes.

Also, the paper will argue for less reliance on highly structured instructional materials that tend to support the culture of authoritarianism and determinism prevalent in schooling experiences, and recommend the use of *investigative* and *exploratory* methodology to encourage creativity and innovation in teaching to address real needs. Finally, the paper will end with a brief discussion on the kind of assessment policy and practice that can support the conception of learning to teach advocated.

Where teacher education has been the target of reforms the measures adopted have not been born out of an analytical evaluation of the challenges of teaching in the African context. Rather the restructuring of programmes have followed fashions and trends emerging from Europe or the United States. Perhaps, part of the reason for this might be the paucity of research in the African context that can offer guidance in developing relevant models to meet local needs. The one form of restructuring that has been gaining popularity in Africa has been the attempts to situate a big part of teacher education in school-based contexts. But unfortunately these programme designs have not resulted in developing appropriate professional practices that are based upon the African situation of schooling. The assumption of many African teachers it appears is that effective teaching and learning occurs simply because certain prescriptive teaching methods are used and not through the outcomes of 'reflection in action' (Jessop & Penny 1998, Akyeampong 2001). A look at some restructured programmes that have included a significant amount of time in schools learning to teach show that the theoretical and practical elements of teaching are not intertwined and presented in a dialogic relationship to underscore the contingency nature of effective teaching. Neither have such programmes created the necessary discursive space to explore the presuppositions upon which teachers in African school contexts base their work, the impact of the psychological context on teaching, and the forces that might be responsible for shaping the different teaching cultures in rural, semi-urban or urban settings. In fact, rarely are school-based teacher education programmes built on an action-oriented framework to exemplify the contextual nature of effective teaching and the role situational understanding plays in guiding appropriate teacher actions. These missing dimensions in restructured teacher education in African contexts may explain why in Ghana, for example, it has not become a transforming experience that shapes motivation and pedagogic beliefs (Akyeampong & Lewin, 2002).

